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09/944,288	08/30/2001	Michael Foley	05125.0001U1	1888	
23859 NEEDLE & R	7590 01/25/2008 OSENBERG P.C	EXAMINER			
NEEDLE & ROSENBERG, P.C. SUITE 1000			TIV, BACKHEAN		
999 PEACHTF ATLANTA, G			ART UNIT	PAPER NUMBER	
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

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		Appli	cation No.	Applicant(s)	
Office Action Summary			44,288	FOLEY ET AL.	
		Exam	niner	Art Unit	
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Period f	The MAILING DATE of this commor Reply	nunication appears o	n the cover sheet	with the correspondence ad	idress
WHIC - Exte afte - If NO - Failt Any	HORTENED STATUTORY PERIOD CHEVER IS LONGER, FROM THE ensions of time may be available under the provising SIX (6) MONTHS from the mailing date of this comperiod for reply is specified above, the maximular to reply within the set or extended period for the reply received by the Office later than three monthed patent term adjustment. See 37 CFR 1.704(1)	E MAILING DATE Olitions of 37 CFR 1.136(a). In ommunication. In statutory period will apply reply will, by statute, cause the this after the mailing date of the status of	F THIS COMMU no event, however, may and will expire SIX (6) No te application to become	NICATION.  y a reply be timely filed  NONTHS from the mailing date of this ce ABANDONED (35 U.S.C. § 133).	
Status	•				
1)⊠	Responsive to communication(s)	filed on 12/5/06.		•	
•	This action is <b>FINAL</b> .	2b) ☐ This action	is non-final.		
,—	Since this application is in condit	<i>′</i> —		atters, prosecution as to the	e merits is
,	closed in accordance with the pra				
Disposit	tion of Claims				
5)□ 6)⊠ 7)□	Claim(s) <u>2,5,6,11-16 and 22-27</u> is  4a) Of the above claim(s) <u>1,3,4,7</u> Claim(s) is/are allowed.  Claim(s) <u>2,5,6,11-16 and 22-27</u> is  Claim(s) is/are objected to  Claim(s) are subject to res	- <u>10 and 17-21</u> is/are s/are rejected. o.	withdrawn from,	consideration.	
Applicat	tion Papers				
9)[	The specification is objected to by	y the Examiner.			
10)[_	The drawing(s) filed on is/a	are: a)□ accepted	or b)□ objected	to by the Examiner.	
	Applicant may not request that any o	•			
11)[	Replacement drawing sheet(s) inclu-	=			
Priority	under 35 U.S.C. § 119				
	Acknowledgment is made of a cla  All b) Some * c) None of the prior  Certified copies of the prior  Copies of the certified copies of the prior  application from the Intern	f: rity documents have rity documents have ies of the priority doc	been received. been received in	n Application No	l Stage
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2) Noti 3) Info	ice of References Cited (PTO-892) ice of Draftsperson's Patent Drawing Revie rmation Disclosure Statement(s) (PTO/SB/ er No(s)/Mail Date		Paper	ew Summary (PTO-413) No(s)/Mail Date of Informal Patent Application	

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## **Detailed Action**

Claims 2,5,6,11-16,22-27 are pending in this application. Claims 1,3,4,7-10,17-21 have been cancelled in the Amendment filed on 12/5/06. This action is made **FINAL**.

## Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 2,5,12-15,22,24,26,27 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent 6,834,299 issued to Hamilton, II et al.(Hamilton) in view of US Publication 2001/0047460 issued to Kobayashi et al.(Kobayashi) in further view of admitted prior art.

As per claim 12, Hamilton teaches a system for automatically configuring a diskless host computer(Abstract), comprising:

at least one diskless host computer that automatically boots an operating system as a result of being connected to the network(Fig.5, col.5, lines 32-67);

a storage system on which are stored a plurality of host configurations, each configuration including an operating system(Fig.5, col.6,lines 1-67); looking up a configuration corresponding to the received identifier and directing the switch to provide the diskless host computer access to a storage device on which the operating system is stored(Abstract, col.7, lines 1-67).

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Hamilton however does not explicitly teach diskless host computer being physically connected to a network; a switch coupled to each diskless host computer and having a plurality of ports, each port coupled to the storage system; and a control station computer monitoring for receipt of an identifier transmitted by the diskless host computer to the switch.

Kobayashi teaches a switch coupled to each diskless host computer and having a plurality of ports, each port coupled to the storage system(Fig.1); and a control station computer monitoring for receipt of an identifier transmitted by the diskless host computer to the switch(Fig.1, para.0024,026).

Therefore it would have been obvious to one ordinary skill in the art at the time of the invention to modify the teachings of Hamilton to include a switch coupled to each diskless host computer and having a plurality of ports, each port coupled to the storage system; and a control station computer monitoring for receipt of an identifier transmitted by the diskless host computer to the switch as taught by Kobayashi in order to remote copy information(Kobayashi, para.0002).

One ordinary skill in the art would have been motivated to combine the teachings of Hamilton and Kobayashi in order to remote copy information(Kobayashi, para.0002).

Admitted prior art explicitly teaches adding new devices to a SAN(Applicant specification, page 1, line 10-page 3, line 9).

Therefore it would have been obvious to one ordinary skill in the art at the time of the invention to modify the teachings of Hamilton in view of Kobayashi to include

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adding new devices to a SAN as taught by applicant specification in order to replace and/or add new SAN devices to a network.

One ordinary skill in the art would have been motivated to combine the teachings of Hamilton, Kobayash, and admitted prior art in order to replace and/or add new SAN devices to a network.

As per claim 22, Hamilton teaches a method for automatically booting a diskless host computer upon being connected to a Fibre Channel network(Abstract), comprising: looking up a configuration corresponding to the received identifier, each configuration including an operating system different from the operating system of other configurations of the plurality of configurations(Fig.5, col.5, lines 32-col.6, lines 67); querying by a control station computer the Fibre Channel switch for the WWN(col.5, lines 31-67); looking up by the control station computer the configuration in a database in response to the WWN, each WWN having a corresponding configuration(Fig.5, col.5, lines 31-col.6, lines 67); providing the diskless host computer access to a storage device on which the operating system is stored(Fig.5, col.5, lines 32-col.6, lines 67); and the diskless host computer booting from the operating system stored on the storage device in response to being connected to network(Fig.5, col.5, lines 32-col.6, lines 67).

Hamilton however does not explicitly teach physically connecting the diskless host computer to the network; receiving at a Fibre Channel switch a World Wide Name (WWN) from the diskless host computer in accordance with a Fibre Channel log-in protocol.

Kobayashi teaches receiving at a Fibre Channel switch a World Wide Name (WWN) from the diskless host computer in accordance with a Fibre Channel log-in protocol (Fig.1, para.0024,026).

Therefore it would have been obvious to one ordinary skill in the art at the time of the invention to modify the teachings of Hamilton to include receiving at a Fibre Channel switch a World Wide Name (WWN) from the diskless host computer in accordance with a Fibre Channel log-in protocol as taught by Kobayashi in order to remote copy information(Kobayashi, para 0002).

One ordinary skill in the art would have been motivated to combine the teachings of Hamilton and Kobayashi in order to remote copy information(Kobayashi, para.0002).

Admitted prior art explicitly teaches adding new devices to a SAN(Applicant specification, page 1, line 10-page 3, line 9).

Therefore it would have been obvious to one ordinary skill in the art at the time of the invention to modify the teachings of Hamilton in view of Kobayashi to include adding new devices to a SAN as taught by applicant specification in order to replace and/or add new SAN devices to a network.

One ordinary skill in the art would have been motivated to combine the teachings of Hamilton, Kobayash, and admitted prior art in order to replace and/or add new SAN devices to a network.

As per claim 2, the method claimed in claim 22, further comprising the step of prior to the step of providing the host access to a storage device, copying the operating

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system to the storage device from another device of the storage system(Hamilton, Abstract, Fig.5).

As per claim 5, the method claimed in claim 22, wherein the control station queries the Fibre Channel switch in response to a notification received from the host via an Internet Protocol (IP) network(Hamilton, Abstract, Fig.5, Kobayashi, para.0024).

Motivation to combine set forth in claim 22.

As per claim13, the system claimed in claim 12, wherein the storage system copies the operating system to the storage device from another device of the storage system(Hamilton, Abstract, Fig.5).

As per claim 14, the system claimed in claim 12, wherein the identifier is a World Wide Name (WWN) received from the host in accordance with a Fibre Channel log-in protocol, and wherein each WWN corresponds to a configuration(Hamilton, Abstract, col.5, line 32-67, Fig.1, para.0024,026). Motivation to combine set forth in claim 12.

As per claim 15, system claimed in claim 14, wherein the a control station computer queries the Fibre, Channel switch for the WWN and looks up the configuration in a database in response to the WWN(Hamilton, Fig.5, col.5, lines 31-col.6, lines 67).

As per claim 24, the method claimed in claim 23, wherein the network comprises an IP network(Kobayashi, para.0024). Motivation to combine set forth in claim 22.

As per claim 26, the method claimed in claim 23, wherein the network comprises a Fibre Channel network (Kobayashi, Abstract). Motivation to combine set forth in claim 22.

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As per claim 27, the method claimed in claim 26, wherein the identifier is unique to an adapter used to connect the diskless computer to the network(Hamilton, col.5, lines 31-col.6, line 67).

As per claim 23, do not teach or further define over the limitations in claims 12,22. Therefore claim 23 is rejected for the same reasons set forth above.

Claims 6,25 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent 6,834,299 issued to Hamilton, II et al.(Hamilton) in view of US Publication 2001/0047460 issued to Kobayashi et al.(Kobayashi) in further view of admitted prior art in further view of US Patent 6,810,478 issued to Anand et al.(Anand).

Hamilton in view of Kobayashi in further view of admitted prior art does not explicitly teach as per claims 6, 25, using DHCP protocol.

Anand teaches using DHCP protocol(col.43-50).

Therefore it would have been obvious to one ordinary skill in the art at the time of the invention to modify the teachings of Hamilton in view of Kobayashi in further view of admitted prior art to include using DHCP protocol as taught by Anand in order to improve flexibility for configuration of computers attached to a network(Anand, col.1, lines 43-49)...

One ordinary skill in the art would have been motivated to combine the teachings of Hamilton, Kobayashi, admitted prior art, and Anand in order to improve flexibility for configuration of computers attached to a network(Anand, col.1, lines 43-49).

Claims 11,16 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent 6,834,299 issued to Hamilton, II et al.(Hamilton) in view of US Publication 2001/0047460 issued to Kobayashi et al.(Kobayashi) in further view of admitted prior art in further view of US Patent 6,343,287 issued to Kumar et al.(Kumar).

Hamilton in view of Kobayashi in further view of admitted prior art however does not teach as per claim 11,16, wherein the database uses the lightweight directory access protocol (LDAP).

Kumar teaches the use of LDAP for a database(Fig.3).

Therefore it would have been obvious at the time of the invention to one ordinary skilled in the art to modify Kobayashi in view of Hamilton in view of Kobayashi in further view of admitted prior art to use LDAP for a database as taught by Kumar in order to comb through data to find a particular piece of information.

One ordinary skilled in the art at the time of the invention would have been motivated to combine the teachings of Hamilton, Kobayashi, admitted prior art, and Kumar in order to provide a system to us a network protocol designed to work on TCP/IP stacks to extract information.

## Response to Arguments

The Office withdraws all previous rejections due to applicant's amendments.

Applicant's arguments with respect to claims 2,5,6,11-16,22-27 have been considered but are most in view of the new ground(s) of rejection.

## **Conclusion**

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Examiner's Note: Examiner has cited particular columns and line numbers in the references as applied to the claims above for the convenience of the applicant.

Although the specified citations are representative of the teachings of the art and are applied to the specific limitations within the individual claim, other passages and figures may apply as well. It is respectfully requested from the applicant in preparing responses, to fully consider the references in its entirety as potentially teaching of all or part of the claimed invention.

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. See PTO-892.

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

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Any inquiry concerning this communication or earlier communications from the examiner should be directed to Backhean Tiv whose telephone number is (571) 272-5654. The examiner can normally be reached on M-F 6:30-3:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Follansbee can be reached on (571) 272-3964. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Backhean Tiv 2151 1/21/08